

ABSTRACT

In a communication network in which a group of connections has an assigned group bandwidth and each connection in the group has a minimum bandwidth, bandwidth usage is controlled by calculating the total current bandwidth allowed to the group, subtracting the total current bandwidth from the assigned group bandwidth, and adding the difference to each connection's current bandwidth allowance to calculate an explicit rate, according to which the connection's bandwidth allowance is controlled. The explicit rate is altered to a minimum explicit rate when, for example, the total bandwidth exceeds the group bandwidth. The minimum explicit rate of each connection is preferably calculated on the basis of the sum of the minimum bandwidths of the active connections in the group. These measures improve the fairness of bandwidth usage control.